REMARKS

Claims 1-27 are pending in the application. Favorable reconsideration of the application is respectfully requested.

I. REQUEST FOR WITHDRAWAL OF FINALITY

Applicants note that the Examiner has made the present Office Action final despite the fact that applicants did not substantively amend the claims in their previous response. Withdrawal of the finality of the Office Action is respectfully requested.

The Examiner contends that since applicants cited the art which forms the basis of the new grounds of rejection, the action is properly made final. (See, O.A., page 6). It appears the Examiner has misunderstood the rules relating to the citation of art in an Information Disclosure Statement (IDS). Both of the references upon which the Examiner now relies were cited by the applicants *prior* to the Examiner issuing a first Office Action. Accordingly, the present Office Action should be treated as if it were **non-final**.

During a telephone conference with the Examiner on November 24, 2003, the undersigned pointed out the above-circumstances to the Examiner. The Examiner instructed the undersigned to proceed with filing a response as if the Office Action were non-final. Accordingly, applicants hereby submit this response.

II. REJECTION OF CLAIMS 1, 7, 10-16 AND 27 UNDER 35 USC §103(a)

Claims 1, 7, 10-16 and 27 are rejected under 35 USC §103(a) based on Zhang in view of Takemura et al. This rejection is respectfully traversed for at least the following reasons.

i. Claim 1

Claim 1 defines an active matrix device as follows:

1. An active matrix device comprising an array of picture elements, each of which comprises an image element, a first charge storage element connected to the image element, and a first semiconductor switch for connecting a data line to the first charge storage element and the image element, characterised in that each picture element comprises a second charge storage element and a second semiconductor switch switchable independently of the first switch to connect the second charge storage element to the first charge storage element and the image element so as to increase the charge storage capacity.

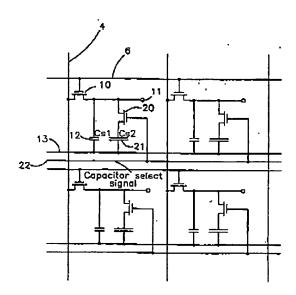
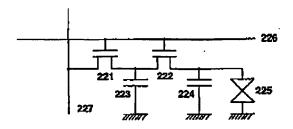


Fig. 6 of Present Application

As illustrated above, Fig. 6 taken from the present application exemplifies an active matrix device in accordance with the present invention. The specification describes how an aspect of the present invention, as recited in claim 1 above, is the provision of a second semiconductor switch 20 which is *switchable independently* of the first semiconductor switch 10. Such independently switchable second semiconductor switch 20 serves to connect the second charge storage element 21 to the first charge storage element 12 *in order to increase the charge storage capacity*.

Ø 005

Serial No.: 10/081,917



GATE SIGNAL LINE
FIG. 1C

IMAGE SIGNAL
LINE
CAPACITOR LINE

CAPACITOR LINE

Fig. 2C of Zhang

Fig. 1C of Takemura et al.

The Examiner now rejects claim 1 under 35 USC §103(a) based on Zhang '074 in view of Takemura et al. '636. The Examiner contends that Fig. 2C of Zhang (reproduced above) teaches a second thin film transistor 222 connected to a second capacitor 224. The Examiner seems to argue that the transistors 221 and 222 represent first and second switches in accordance with the invention of claim 1. The Examiner then refers to Fig. 1C of Takemura et al. (also reproduced above) as teaching a similar configuration with transistors 121 and 122.

To the extent the Examiner considers the transistors 221/222 or 121/122 to constitute first and second switches as recited in claim 1, the applicants respectfully disagree with such an interpretation. For example, claim 1 refers to the first semiconductor switch as connecting a data line to the first charged stored element and the image element. In Zhang and Takemura et al., the transistors 222 and 122 do not connect the image element to the data line. Rather, the transistors 222 and 122 connect the image elements to transistors 221 and 121, which in turn connect transistors 222 and 122 to the data line. Conversely, the transistors 221 and 121 do not connect the data line to the image element.

Furthermore, the transistors 221/222 in Zhang and transistors 121/122 in Takemura et al. are <u>not</u> switchable *independently* as recited in claim 1. As is noted in Zhang, the transistors 221/222 are turned on and off concurrently by the sam gate line

226. Similarly, the transistors 121/122 in Takemura et al. are turned on and off concurrently by the same gate line. There is no teaching or suggestion in either of the references with regards to making such transistors switchable independently.

Rather, Zhang and Takemura et al. provide multiple transistors 221/222 and 121/122 in series between the data line and the image element in order to reduce the OFF current. Thus, multiple transistors are each tied to the same gate signal line and are switched on together (i.e., non-independently) when the gate signal line goes active. In view of such objective, it would make very little sense to one having ordinary skill in the art to provide switches in Zhang or Takemura et al. which are switchable independently as recited in claim 1.

III. REJECTION OF CLAIMS 2-6, 8, 9 AND 18-26 UNDER 35 USC §103(a)

Claims 2-6 are rejected under 35 USC §103(a) based on Zhang, Takemura et al. and Chen et al. Claims 8 and 9 are rejected under 35 USC §103(a) based on Zhang, Takemura et al. and Maurice. Claim 18-20 are rejected under 35 USC §103(a) based on Zhang, Takemura et al. and Koifman et al. Claims 21-23 are rejected under 35 USC §103(a) based on Zhang, Takemura et al., Koifman et al. and Williams et al. Claim 24 is rejected under 35 USC §103(a) based on Zhang, Ohtani, Koifman et al., Williams et al. and Razdan. Claim 25 is rejected under 35 USC §103(a) based on Zhang, Takemura et al., Koifman et al., William et al. and Kusunoki. Claim 26 is rejected under 25 USC §103(a) based on Zhang, Takemura et al., Koifman et al., William et al., Kusunoki and Hirase et al.

Each of the above claims depends from claim 1 either directly or indirectly. Accordingly, they may be distinguished over the teachings of Zhang and Takemura et al. for at least the same reasons. Moreover, the remaining references do not make up for the above-discussed deficiencies in Zhang and Takemura et al.

As a result, withdrawal of the rejections is respectfully requested.¹

¹Applicants respectfully request clarification of the status of claim 17. It does not appear that claim 17 has been rejected based on the art of record.

IV. CONCLUSION

Accordingly, all claims 1-27 are believed to be allowable and the application is believed to be in condition for allowance. A prompt action to such end is earnestly solicited.

Should the Examiner feel that a telephone interview would be helpful to facilitate favorable prosecution of the above-identified application, the Examiner is invited to contact the undersigned at the telephone number provided below.

Should a petition for an extension of time be necessary for the timely reply to the outstanding Office Action (or if such a petition has been made and an additional extension is necessary), petition is hereby made and the Commissioner is authorized to charge any fees (including additional claim fees) to Deposit Account No. 18-0988.

Respectfully submitted,

RENNER, OTTO, BOISSELLE & SKLAR, LLP

Mark D. Saralino Reg. No. 34,243

DATE: Februs 9, 2004

The Keith Building 1621 Euclid Avenue Nineteenth Floor Cleveland, Ohio 44115 (216) 621-1113 C:\GENYAMA\yamap802.aaf.wpd